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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/538,900	06/14/2005	Scott Thomas Milner	2003B133A	6056

23455 7590 11/26/2008
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EXAMINER	
RABAGO, ROBERTO	

ART UNIT	PAPER NUMBER
1796	

MAIL DATE	DELIVERY MODE
11/26/2008	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	10/538,900	MILNER ET AL.	
	Examiner	Art Unit	
	Roberto Rábago	1796	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *13 August 2008*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-7,9-18,20-51,53 and 59* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☒ Claim(s) *31* is/are allowed.

6)☒ Claim(s) *1-7,9-18,20-30,32-51,53 and 59* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Terminal Disclaimer

1. The terminal disclaimer filed on 8/13/2008 disclaiming the terminal portion of any patent granted on this application which would extend beyond the expiration date of any patent granted on Application 10/539,013 has been reviewed and is accepted. The terminal disclaimer has been recorded.

Claim Rejections - 35 USC § 103

2. Claims 1, 9, 10 and 29 are rejected under 35 U.S.C. 103(a) as being unpatentable over Vandenberg et al. (US 3,883,449).

The reference discloses in Example 1 a polymerization reaction comprising as catalyst/initiator a mixture of triisobutylaluminum, water and boron trifluoride, including all claimed limitations except for inclusion of an HFC. However, patentee recommends alternative diluents, including several HFCs, at col. 6, lines 47-53, providing suitable motivation for use of an HFC in methods analogous to those exemplified. Applicants' comparative results have been reviewed, but they provide no basis for a showing of unexpected results because they do not make comparison with the method of Vandenberg; i.e., polymerization of a halogenated epoxybutane.

Double Patenting

3. Claims 1, 9, 10, 28, 2-7, 11-18, 20-30, 33, 35-51 and 53 are rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-35 of U.S. Patent No. 7,414,101. Although the conflicting claims are not identical, they are not patentably distinct from each other because, in spite of different claim organization, essentially identical methods have been set forth in each claim set. The instant claims differ from those patented in that the polymerization temperature and pressure have not been included in the patented claims. However, such use would be obvious simply by operating the patented method in accordance with the repeated explicit teachings of the patented disclosure (see col. 7, last paragraph, col. 32, lines 1-45, and all polymerization examples).

Regarding claim 37, use of the claimed reactors would be obvious because applicants have claimed a broad scope of conventional reactors for use in a condensed phase polymerization method. Regarding claims 42-46 and 51, the patented method would appear to inherently make the claimed polymers because a substantially identical method has been set forth.

4. Claims 1, 9, 10, 28, 2-7, 11-18, 20-30, 32, 33, 35-40, 48-50, 53 and 59 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-58 of Application 11/728,306, particularly in view of copending claim 24. Although the conflicting claims are not identical, they are not patentably distinct from each other because the instant claims are obvious over the copending claims. The copending claims recite a process of polymerization which is

substantially the same as that claimed instantly, but includes an additional polymorphogenate component, and therefore the broader instant claims are obvious over the copending claims. The instant claims differ from the copending claims in that the polymerization temperature and pressure have not been included in the copending claims. However, such use would be obvious simply by operating the copending method in accordance with the repeated explicit teachings of the disclosure (see [0126] through [0128], and all polymerization examples).

Regarding claims 6 and 7, selection of an HFC from the instantly claimed list would be obvious because applicants appear to have included essentially all of the most common HFCs.

Regarding claim 37, use of the claimed reactors would be obvious because applicants have claimed a broad scope of conventional reactors for use in a condensed phase polymerization method.

Regarding claims 38-40, selection of an HFC within the claimed scope would be obvious because most common HFCs have dielectric constants within the claimed range.

4. Claims 1, 9, 10, 22-25, 32 and 59 are provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 120-161 of Application 11/628,608. Although the conflicting claims are not identical, they are not patentably distinct from each other because the instant claims are obvious over the copending claims. The copending claims recite a process of polymerization which is

substantially the same as that claimed instantly, but includes an additional process of combining feed streams, and therefore the broader instant claims are obvious over the copending claims. The instant claims differ from the copending claims in that the polymerization temperature and pressure have not been included in the copending claims. However, such use would be obvious simply by operating the copending method in accordance with the repeated explicit teachings of the disclosure (see [0107] through [0109], and all polymerization examples).

5. Claims 28, 2-7, 26, 30, 32, 34-40, 49, 51 and 59 are rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-31 of Patent 7,402,636, particularly in view of patented claims 14-27. Although the conflicting claims are not identical, they are not patentably distinct from each other because the instant claims are obvious over the copending claims. The patented claims recite a process of polymerization which is substantially the same as that claimed instantly, but includes an additional process of providing an alcohol to the reactor, and therefore the broader instant claims are obvious over the patented claims. The instant claims differ from those patented in that the polymerization temperature, pressure, and HFC percentage have not been included in the patented claims. However, such use would be obvious simply by operating the patented method in accordance with the repeated explicit teachings of the patented disclosure (see col. 18, line 48 through col. 19, line 6, and polymerization examples 1-7). Regarding HFC percentage, the claims

do not state or imply that only a trivial percentage should be used, and therefore an amount greater than 5% would be an obvious selection.

Regarding claims 26 and 28, although the patented claims do not specify either the Lewis acid or the transition metal, applicants' instant claims appear to have attempted to include substantially every conventional Lewis acid catalyst and metal group from which such acids are made, and therefore selection from the claimed scope would be obvious.

6. Regarding each of the provisional rejections set forth above, it is noted that the copending claims include additional structure not recited in the instant claims, and therefore similar obviousness-type double patenting rejections in said applications may not be possible over this application. Accordingly, even if the provisional rejections became the sole remaining issues, they would not likely be withdrawn in the absence of terminal disclaimer, substantive traversal, or claim amendment.

7. Claim 31 is allowed.

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Roberto Rábago whose telephone number is (571) 272-1109. The examiner can normally be reached on Monday - Friday from 8:00 - 4:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Wu can be reached on (571) 272-1114. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Roberto Rábago/
Primary Examiner
Art Unit 1796

RR
November 22, 2008